

Form PTO-1449 (MODIFIED) MAY 2004 PATENT & TRADEMARK OFFICE		U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE		ATTY. DOCKET NO. 032026-0769	SERIAL NO. 10/751,302		
INFORMATION DISCLOSURE CITATION (Use several sheets if necessary)		APPLICANT		Guilherme L. INDIG			
		FILING DATE 01/02/2004		GROUP ART UNIT 1615			
U.S. PATENT DOCUMENTS							
EXAMINER INITIAL	REF	DOCUMENT NUMBER	DATE	NAME	CLASS	SUB-CLASS	FILING DATE IF APPROPRIATE
N		2002/0123530	09/05/2002	Indig			
W		5,773,460	06/30/1998	Gaboury et al.			
FOREIGN PATENT DOCUMENTS							
REF	DOCUMENT NUMBER	DATE	COUNTRY	CLASS	SUB-CLASS	TRANSLATION	
						YES	NO
OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)							
W		Albota, M. A. et al., "Two-photon fluorescence excitation cross sections of biomolecular probes from 690 nm to 960 nm," <i>Appl. Optics</i> , Vol. 37, No. 31, pp. 7352-7356, 1998.					
W		Anderson, G. S. et al., "Inactivation of photosensitizing merocyanine dyes by plasma, serum and serum components," <i>Photochem. Photobiol.</i> , Vol. 64, No. 4, pp. 683-687, 1996; American Society for Photobiology.					
✓		Ara, G. et al., "Mechanism of mitochondrial photosensitization by the cationic dye, N,N-bis(2-ethyl-1,3-dioxolane)krypto-cyanine (EDKC): preferential inactivation of complex I in the electron transport chain," <i>Cancer Res.</i> , Vol. 47, pp. 6580-6585, 1987.					
W		Baptista, M. S. et al., "Mechanism of photobleaching of Ethyl Violet non-covalently bound to bovine serum albumin," <i>Chem. Commu.</i> , pp. 1791-1992, 1997.					
W		Baptista, M. S. et al., "Effect of BSA binding on photophysical and photochemical properties of triarylmethane dyes," <i>J. Phys. Chem.</i> , Vol. 102B, pp. 4678-4688, 1998; American Chemical Society.					
EXAMINER <i>Neesh</i>				DATE CONSIDERED <i>8/22/05</i>			
<p>* EXAMINER: Initial if citation considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include any copy of this form with next communication to applicant.</p>							

Form PTO-1449 (MODIFIED)		U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE	ATTY. DOCKET NO. 032026-0769	SERIAL NO. 10/751,302
INFORMATION DISCLOSURE CITATION  (Use several sheets if necessary)		APPLICANT	Guilherme L. INDIG	
		FILING DATE	GROUP ART UNIT 1615	
OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)				
U		Bartlett J. A. et al., "Effect of Self-association and Protein Binding on the Photochemical Reactivity of Triarylmethanes. Implications of Noncovalent Interactions on the Competition between Photosensitization Mechanisms Type I and Type II," <i>Photochem. Photobiol.</i> , Vol. 70, pp. 490-498, 1999; American Society for Photobiology.		
n		Bartlett, J. A. et al., "Spectroscopic and photochemical properties of Malachite Green noncovalently bound to bovine serum albumin," <i>Dyes and Pigments</i> , Vol. 43, pp. 219-226, 1999; Elsevier Science Ltd.		
U		Chance, B., "Fluorescent probe environment and the structural and charge changes in energy coupling of mitochondrial membranes," <i>Proc. Natl. Acad. Sci. USA</i> , Vol. 67, No. 2, pp. 560-564, 1970.		
U		Chen, L. B., "Mitochondrial membrane potential in living cells," <i>Ann. Rev. Cell Biol.</i> , Vol. 4, pp. 155-181, 1988; Annual Reviews Inc.		
U		Davis, S. et al., "Mitochondrial and plasma membrane potentials cause unusual accumulation and retention of rhodamine 123 by human breast adenocarcinoma-derived MCF-7 cells," <i>J. Biol. Chem.</i> , Vol. 260, pp. 13844-13850, 1985; The American Society of Biological Chemists, Inc.		
U		Denk, W. et al., "2-photon laser scanning fluorescence spectroscopy," <i>Science</i> , Vol. 248, pp. 73-76, 1990.		
U		Docampo, R. et al., "Light enhanced free radical formation and trypanocidal action of gentian violet (crystal violet)," <i>Science</i> , Vol. 220, pp. 1292-1294, 1983.		
U		Docampo, R. et al., "Prevention of Chagas' disease resulting from blood transfusion by treatment of blood: toxicity and mode of action of gentian violet," <i>Biomed. Environ. Sci.</i> , Vol. 1, pp. 406-413, 1988; Academic Press, Inc.		
U		Docampo, R. et al., "Enhancement of the cytotoxicity of crystal violet against <i>Trypanosoma cruzi</i> in the blood by ascorbate," <i>Molec. Biochem. Parasitol.</i> , Vol. 27, pp. 241-248, 1988; Elsevier Science Publishers B.V.		
U		Duxbury, D. F., "The photochemistry and photophysics of triphenylmethane dyes in solid and liquid media," <i>Chem. Rev.</i> , Vol. 93, pp. 381-433, 1993.		
		Dyer, H. M., <i>An Index of Tumor Chemotherapy</i> , NIH, Aug. 13, 1951, pp. 10-12, 123 and 124.		
U		Fiedorowicz, M. et al., "Efficient Photodynamic Action of Victoria Blue BO Against the Human Leukemic Cell Lines K-562 and TF-1," <i>Photochemistry and Photobiology</i> , Vol. 58, No. 3, pp. 356-361, 1993; American Society for Photobiology.		
U		Fiedorowicz, M. et al., "The Photodynamic Effect of Victoria Blue BO on Peripheral Blood Mononuclear and Leukemic Cells," <i>Photochem. Photobiol.</i> , Vol. 65, No. 5, pp. 855-861, 1997; American Society for Photobiology.		
U		Fischer, V. et al., "Spectroscopic studies of cutaneous photosensitizing agents. V. Spin trapping and direct electron spin resonance investigations of the photoreduction of gentian (crystal) violet," <i>Photochem. Photobiol.</i> , Vol. 7, pp. 11-19, 1984; Elsevier Science Publishers B.V.		
U		Foote, C. S., "Mechanism of photosensitized oxidation," <i>Science</i> , Vol. 162, No. 3857, pp. 963-970, 1968.		

Form PTO-1449 (MODIFIED)		U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE		ATTY. DOCKET NO. 032026-0769	SERIAL NO. 10/751,302
INFORMATION DISCLOSURE CITATION  (Use several sheets if necessary)		APPLICANT		Guilherme L. INDIG	
		FILING DATE		GROUP ART UNIT	
		01/02/2004		1615	
OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)					
h		Foote, C. S., "Definition of type I and type II photosensitized oxidation," <i>Photochem. Photobiol.</i> , Vol. 54, No. 5, p. 659, 1991; Pergamon Press plc, printed in Great Britain.			
h		Gadelha, F. R. et al., "The mitochondrion of <i>Trypanosoma cruzi</i> is a target of CV toxicity," <i>Molec. Biochem. Parasitol.</i> , Vol. 34, pp. 117-126, 1989; Elsevier Science Publishers B.V. (Biomedical Division).			
h		Gaffney D. K. et al., "Merocyanine 540-sensitized photoinactivation of leukemia cells: Role of oxygen and effects on plasma membrane integrity and mitochondrial respiration," <i>Exp. Hematol.</i> , Vol. 18, pp. 23-26, 1990; International Society for Experimental Hematology.			
h		Hamal, S. et al., "Actinometric determination of absolute fluorescence quantum yields," <i>J. Phys. Chem.</i> , Vol. 87, pp. 83-89, 1983; American Chemical Society.			
h		Hatchard, D. G., "A new sensitive chemical actinometer. II. Potassium ferrioxalate as a standard chemical actinometer," <i>Proc. R. Soc. London, Ser. A</i> , Vol. 235, pp. 518-536, 1956.			
		Indig, G. L., "Photochemistry of triarylmethane dyes bound to proteins," <i>Proceedings of Optical Methods for Tumor Treatment and Detection: Mechanisms and Techniques in Photodynamic Therapy V</i> , Vol. 2675, pp. 228-237, 1996; Society of Photo-Optical Instrumentation Engineers.			
h		Indig, G. L., "Mechanism of Dye Bleaching upon Laser Excitation of Crystal Violet Bound to Bovine Serum Albumin," <i>Chemistry Letters</i> , pp. 243-244, 1997; The Chemical Society of Japan.			
h		Indig, G. L., "Mechanisms of action of cationic dyes in photodynamic therapy of tumors," <i>Recent Res. Devel. Pure &amp; Applied Chem.</i> , Vol. 3, pp. 9-19, 1999.			
h		Indig, G. L., "Effect of Molecular Structure on the Performance of Triarylmethane Dyes as Therapeutic Agents for Photochemical Purging of Autologous Bone Marrow Grafts from Residual Tumor Cells," <i>J. Pharm. Sci.</i> , Vol. 89, No. 1, pp. 88-99, 2000; Wiley-Liss, Inc. and the American Pharmaceutical Association.			
h		Indig, G., et al., "Effect of Molecular Structure on the Phototoxicity of Triarylmethane Dyes Towards Tumor and Normal Cells," Abstract, 30 <sup>th</sup> Annual Meeting of the American Society for Photobiology, Quebec City, Canada, July 13-17, 2002; Allen Press, Inc. 2001.			
h		Iscove, N. N. et al., "Erythroid colony formation in cultures of mouse and human bone marrow: analysis of the requirement for erythropoietin by gel filtration and affinity chromatography on agarose-concanavalin-A," <i>J. Cell Physiol.</i> , Vol. 83, pp. 309-320, 1974.			
h		Jockusch, S. et al., "Radical addition rate constants to acrylates and oxygen: $\alpha$ -hydroxy and $\alpha$ -amino radicals produced by photolysis of photoinitiators," <i>J. Am. Chem. Soc.</i> , Vol. 121, pp. 3921-3925, 1999; American Chemical Society.			
h		Kandela, I. K. et al., "Effect of Molecular Structure on the Selective Phototoxicity of Triarylmethane Dyes Towards Tumor Cells," <i>J. Pharm. Sci.</i> , Vol. 89, No. 1, January 2000, and <i>Photochem. Photobiol. Sci.</i> , pp. 309-314, 2002; The Royal Society of Chemistry and Owner Societies.			
h		Kasha, M. et al., "The exciton model in molecular spectroscopy," <i>Pure Appl. Chem.</i> , Vol. 11, pp. 371-392, 1965.			

Form PTO-1449 (MODIFIED)		U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE		ATTY. DOCKET NO. 032026-0769	SERIAL NO. 10/751,302
INFORMATION DISCLOSURE CITATION  (Use several sheets if necessary)		APPLICANT Guilherme L. INDIG			
		FILING DATE 01/02/2004	GROUP ART UNIT 1615		
OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)					
✓		Kawakami, M. et al., "Synthesis and evaluation of novel rhodacyanine dyes that exhibit antitumor activity," <i>J. Med. Chem.</i> , Vol. 40, pp. 3151-3160, 1997; American Chemical Society.			
✓		Kowaltowski, A. J. et al., "Mitochondrial effects of triarylmethane dyes," <i>J. Bioenerg. Biomembr.</i> , Vol. 31, pp. 579-588, 1999; Plenum Publishing Corporation.			
✓		Koya, K. et al., "MKT-077, a novel rhodacyanine dye in clinical trials, exhibits anticarcinoma activity in preclinical studies based on selective mitochondrial accumulation," <i>Cancer Res.</i> , Vol. 56, pp. 538-543, 1996.			
✓		Kraljic, I. et al., "A new method for the detection of singlet oxygen in aqueous solution," <i>Photochem. Photobiol.</i> , Vol. 28, pp. 577-581, 1978; Pergamon Press Ltd.			
✓		Leo, A. et al., "Partition coefficients and their uses," <i>Chem. Rev.</i> , Vol. 71, No. 6, pp. 525-616, 1971.			
✓		Lewis, M. R. et al., "The Tumor-inhibitory Activity of Diaryl- and Triarylmethane Dyes," <i>Cancer Research</i> , Vol. 13, pp. 130-136, 1953.			
✓		Liao, Y. et al., "Alcohol effect on equilibrium constants and dissociation dynamics of xanthone-cyclodextrin complexes," <i>J. Phys. Chem.</i> , Vol. 11, pp. 734-743, 1996; American Chemical Society.			
✓		Lueck, H. B. et al., "Aggregation of triphenylmethane dyes in aqueous solution: dimerization and trimerization of crystal violet and ethyl violet," <i>Spectrochim Acta</i> , Vol. 48A, pp. 819-828, 1992; Pergamon Press Ltd.			
✓		Modica-Napolitano, J. S., "Photoactivation Enhances the Mitochondrial Toxicity of the Cationic Rhodacyanine MKT-077," <i>Cancer Res.</i> , Vol. 58, pp. 71-75, 1998.			
✓		Moraes-Souza, H. et al., "Strategies for prevention of transfusion-associated Chagas' disease," <i>Transf. Med. Rev.</i> , Vol. X, No. 3, pp. 161-170, 1996; W. B. Saunders Company.			
✓		Moreno, S. N. J. et al., "Crystal Violet as an Uncoupler of Oxidative Phosphorylation in Rat Liver Mitochondria," <i>J. Biol. Chem.</i> , Vol. 263, pp. 12493-12499, 1988; The American Society for Biochemistry and Molecular Biology, Inc.			
✓		Morgan, A. R. et al., "Synthesis and <i>in vivo</i> Activity of Some Porphyrindione Derivatives with Potential in Photodynamic Therapy," <i>Journal of Photochemistry and Photobiology, B: Biology</i> , Vol. 6, pp. 133-141, 1990; Elsevier Sequoia/Printed in The Netherlands.			
✓		Morgan, A. R. et al., "Diels-Alder Adducts of Vinyl Porphyrins: Synthesis and <i>in Vivo</i> Photodynamic Effect against a Rat Bladder Tumor," <i>J. Med. Chem.</i> , Vol. 33, pp. 1258-1262, 1990; American Chemical Society.			
✓		Morgan, A. R. et al., "Tin Etiopurpurin Dichloride-Sensitized Lipid Photooxidation of Erythrocyte Membranes," <i>Photochemistry and Photobiology</i> , Vol. 52, No. 5, pp. 987-991, 1990; Pergamon Press, Great Britain.			

Form PTO-1449 (MODIFIED)		U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE		ATTY. DOCKET NO. 032026-0769	SERIAL NO. 10/751,302
INFORMATION DISCLOSURE CITATION  (Use several sheets if necessary)		APPLICANT		Guilherme L. INDIG	
		FILING DATE		GROUP ART UNIT	
		01/02/2004		1615	
OTHER DOCUMENTS (Including Author, Title, Date, Pertinent Pages, Etc.)					
u		Morgan, J. et al., "GRP78 induction by calcium ionophore potentiates PDT using the mitochondrial targeting dye Victoria Blue BO," <i>Photochem. Photobiol.</i> , Vol. 67, No. 1, pp. 155-164, 1998; American Society for Photobiology.			
u		Nussenzweig, V. et al., "Action of certain dyes on <i>T. cruzi</i> in vitro. The use of gentian violet to prevent the transmission of Chagas," <i>Hospital (Rio J.)</i> , Vol. 44, No. 6, pp. 731-744, 1953.			
u		Oseroff, A. R., "Cationic Sensitizers, Combination Therapies, and New Methodologies," <i>Photodynamic therapy: Basic principles and clinical applications</i> , pp. 79-96, 1992; Dekker, New York.			
u		Patel, J. et al., "Design of Novel Analogs of Victoria Blue BO (VBBQ) for Photodynamic Therapy," <i>Abstracts of Papers of the American Chemical Society</i> , Vol. 203, April 5-10, 1992, San Francisco, California.			
u		Ramirez, L. E. et al., "Prevention of transfusion-associated Chagas' disease by sterilization of <i>Trypanosoma cruzi</i> -infected blood with gentian violet, ascorbic acid, and light," <i>Transfusion</i> , Vol. 35, No. 3, pp. 226-230, 1995.			
u		Reszka, K. et al., "Photosensitization by the trypanocidal agent crystal violet. Type I versus type II reactions," <i>Chem. Biol. Interactions</i> , Vol. 58, pp. 161-172, 1986; Elsevier Scientific Publishers Ireland Ltd.			
u		Riley, J. F., M.D., "Retardation of Growth of a Transplantable Carcinoma in Mice Fed Basic Metachromatic Dyes," <i>Cancer Research</i> , Vol. 8, pp. 183-188, 1948.			
u		See-Lasley, K. et al., <i>Manual of Oncology Therapeutics</i> , pp. 88 and 104, 1981; The C. V. Mosby Company.			
u		Sieber, F. et al., "Selective killing of leukemic cells by merocyanine 540-mediated photosensitization," <i>Proc. Natl. Acad. Sci. USA</i> , Vol. 81, pp. 7584-7587, 1984.			
u		Sundstrom, V. et al., "Picosecond kinetics of radiationless relaxations of triphenylmethane dyes. Evidence for a rapid excited-state equilibrium between states of differing geometry," <i>Chem. Phys.</i> , Vol. 73, pp. 439-458, 1982; North-Holland Publishing Company.			
u		Traul, D. L. et al., "Potentiation of Merocyanine 540-Mediated Photodynamic Therapy by Salicylate and Related Drugs," <i>Photochemistry and Photobiology</i> , Vol. 62, No. 4, pp. 790-799, 1995; American Society for Photobiology.			
u		Viola, A. et al., "Electron paramagnetic resonance evidence of the generation of superoxide and hydroxyl radicals by irradiation of a new photodynamic therapy photosensitizer, Victoria Blue BO," <i>J. Photochem. Photobiol. B: Biol.</i> , Vol. 32, pp. 49-58, 1996; Elsevier Science S.A.			
u		Vogel, M., "Efficient intramolecular fluorescence quenching in triphenylmethane dyes involving excited states with charge separation and twisted conformations," <i>Ber Bunsen-Ges. Phys. Chem.</i> , Vol. 89, pp. 962-968, 1985; VCH Verlagsgesellschaft mbH, D-6940 Weinheim.			
u		Wadwa, K. et al., "Cationic Triarylmethane Photosensitizers for Selective Photochemotherapy: Victoria Blue-BO, Victoria Blue-R and Malachite Green," <i>Advances in Photochemotherapy</i> , Vol. 997, pp. 154-161, 1988.			
u		Yamazaki, T. et al., "Role of Cytoprotective Mechanisms in the Photochemical Purging of Autologous Bone Marrow Grafts," <i>Experimental Hematology</i> , Vol. 25, pp. 629-637, 1997; International Society for Experimental Hematology.			

